

## PATENT

## REMARKS

Claims 1 and 4-13 are pending in the application. Claims 1 and 4-13 have been rejected.

**Rejections under 35 U.S.C. § 102**

Claims 1, 4, 5, 8 and 9 were rejected under 35 U.S.C. §102(e) as being anticipated by U.S. Patent 6,665,537 to Lioy (hereinafter "Lioy").

"A claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." M.P.E.P. § 2131 (Aug. 2001) (*quoting Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir. 1987)). "The identical invention must be shown in as complete detail as is contained in the . . . claim." *Id.* (*quoting Richardson v. Suzuki Motor Co.*, 868 F.2d 1226, 1236, 9 USPQ2d 1051, 1053 (Fed. Cir. 1987)). In addition, "the reference must be enabling and describe the applicant's invention sufficiently to have placed it in possession of a person of ordinary skill in the field of the invention." *In re Paulsen*, 30 F.3d 1475, 1479, 31 USPQ2d 1671, 1673 (Fed. Cir. 1994).

Applicants respectfully submit that claims 1 and 4-13 are not anticipated by Lioy for the reasons and explanations set forth below.

With respect to claim 1, Applicants respectfully submit that Lioy does not teach or suggest all of the limitations of claim 1. In particular, Lioy does not disclose "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station".

Lioy discloses a method for invoking mobile node registration in a wireless communication network. The communication device monitors the packetized data from an Internet Protocol (IP) address contained in an IP address request. (Abstract) If the IP address is for a static IP address the communication device waits for network movement information. (Abstract) Based on the received network movement information, the communication device solicits network address information. (Abstract) Upon receipt of the network address information, the terminal device then initiates Mobile Node registration. (Abstract). As a result,

**PATENT**

the Mobile Node registration is **automatically** invoked whenever the terminal device changes its network point-of-attachment. (Abstract, emphasis added)

Liroy automatically re-registers the mobile node whenever movement is detected. This re-registration occurs regardless of the type of radio access networks involved. Liroy does not take into account routing ambiguities caused by the movement from one radio access network of one type to a second radio access network of a second type. Therefore, Liroy does not disclose "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station". Nothing in Liroy provides for analyzing the radio access networks involved to ascertain whether they are of different types. Applicants submit that claim 1 is not anticipated by Liroy.

Claims 4, 5 and 9 are each allowable for the reasons given above for claim 1.

Claim 8 is allowable as depending from allowable claim 1. Furthermore, claim 8 is allowable as Liroy does not disclose "wherein said determining comprises sending a fake origination to said second radio access network". The Examiner cites column 9, line 65 to column 10 line 1 as disclosing "wherein said determining comprises sending a fake origination to said second radio access network". Applicants respectfully disagree. Liroy states "In state 460, the MT2 device 104 sends a Solicitation Message to available Foreign Agents to exploit the default Agent Advertisement mechanism, as outlined in Mobile IP RFC 2002." A Solicitation Message sent to a Foreign Agent is not "a fake origination". Furthermore, a Solicitation Message is sent to the Foreign Agent, not to "a second radio access network". Applicants respectfully submit that Liroy does not disclose "wherein said determining comprises sending a fake origination to said second radio access network".

**Rejections under 35 U.S.C. § 103**

Claims 6 and 7 were rejected under 35 U.S.C. §103(a) as being obvious over Kioy in view of U.S. Patent 6,708,031 to Purnadi (hereinafter "Purnadi").

## PATENT

Applicants respectfully submit that the rejection of these claims under 103(a) based the above-recited art references are improper because Purnadi may not be used as a prior art reference under 103(a), according to section 103(c). Specifically, 35 USC § 103(c) excludes references which may only qualify as prior art under 35 USC § 102(e), (f), and (g) from being used as a prior art reference under 35 USC § 103(a) under certain circumstances. The text of 35 USC § 103(c) recites "Subject matter developed by another person, which qualifies as prior art only under one or more of subsections (e), (f) and (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person." See 35 USC § 103(c), MPEP 706.02(I)(1), 37 CFR § 1.104(c)(4).

Purnadi was filed on December 5, 2000 and issued on March 16, 2004 while the present application was filed on December 6, 2000, which was before the date Purnadi was issued. Therefore, Purnadi may only qualify as a prior art reference under 102(e). However, the subject matter of Purnadi and the claimed present invention were, at the time the invention was made, owned by Qualcomm Incorporated or subject to an obligation of assignment to Qualcomm Incorporated. Accordingly, based on section 103(c), Purnadi may not be used as a prior art reference under 103(a) as a basis for rejecting the present claims under section 103(a). Therefore, Applicants respectfully request that the rejection of the above-recited claims under 35 USC § 103(a) be withdrawn.

To establish a prima facie case of obviousness, the prior art reference (or references when combined) must teach or suggest all the claim limitations. "The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art, not in Applicants' disclosure." *In re Vaeck*, 947 F.2d 488, 20 USPQ2d 1438 (Fed. Cir. 1991).

Applicants respectfully submit that a prima facie case of obviousness has not been established regarding claims 6 and 7 because the prior art cited does not teach or suggest all the claim limitations.

Claims 6 and 7 depend from claim 1. Claim 1 is not rendered obvious by Lioy for the reasons given above for claim 1. Additionally, claims 6 and 7 are not rendered obvious by the

## PATENT

combination of Lioy and Purnadi. Neither Lioy nor Purnadi teaches or suggests the limitation “determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station”. Purnadi is directed toward a method of triggering a new session or handoff procedure for multi-network systems where the networks are incompatible. Purnadi discloses a first identifier from the first network is determined. This identifier determines the location of the user equipment in the first network. (Col. 2, lines 24-29). The first identifier is provided to an entity connected to the first and second networks. The entity associates a second identifier of the second network with the first identifier of the first network. (Col. 2, lines 29-33). The entity associates a second identifier of the second network with the first identifier of the first network. The second identifier indicates the location of the user equipment in the second network. A second identifier of the second network is determined which indicates the location of the user equipment using said entity for associating the first identifier and the second identifier. (Col. 2, lines 33-39). Combining Lioy and Purnadi does not provide the teaching of applicants’ invention, specifically “determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station”. Therefore, claims 6 and 7 are not rendered obvious by the combination of Lioy and Purnadi.

Claims 10 and 11 were rejected under 35 U.S.C. §103(a) as being obvious over Lioy in view of U.S. Patent Application Publication No. US 2002/0067692 to Yun (hereinafter “Yun”).

Claims 10 and 11 depend from claim 9 and are allowable for the same reasons given above for claim 1. Additionally, Applicants submit that claims 10 and 11 are allowable over the combination of Lioy and Yun because the combination does not teach or suggest the limitation “determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station”.

Lioy has been discussed above. Yun discloses a method for assigning orthogonal codes used for a first system and a second system in a CDMA system including channels of the first system for spreading a pilot signal, a sync signal, a paging signal and a traffic signal with a first

## PATENT

set of orthogonal codes corresponding to orthogonal code numbers in different rows from a set of orthogonal codes arranged in a matrix of m rows and m columns, and channels of the second system for spreading a second set of orthogonal codes corresponding to orthogonal code numbers different from said orthogonal code numbers for the first set of orthogonal codes. (Abstract)

Therefore, neither Lioy nor Yun, nor the combination of Lioy and Yun teaches or suggests "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station". Applicants respectfully submit that claims 10 and 11 are allowable.

Claim 12 was rejected as being unpatentable over Lioy as applied to claim 9, and further in view of Yun and U.S. Patent Application Publication No. 2002/0067707 to Morales (hereinafter "Morales").

Claim 12 is allowable as depending from allowable claim 9, as discussed above. Applicants submit that claim 12 is further allowable as the combination of Lioy, Yun and Morales fails to teach or disclose the limitation "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station". Lioy and Yun as discussed above apply to this discussion. Morales discloses a method and apparatus to control handoff between two different wireless systems. A link is provided between the first and second base station systems to enable a network-initiated handoff procedure. If a source base station system detects that a handoff of a mobile station is required, the source base station system exchanges messaging over the link with the target base station system to perform the handoff. (Abstract). The combination of Lioy, Yun and Morales fails to teach or suggest the limitation "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station". Applicants respectfully submit that claim 12 is allowable for the reasons given above.

Claim 13 was rejected as being unpatentable over Lioy as applied to claim 9 above, and further in view of Yun and U.S. Patent 5,657,375 to Connolly.

**PATENT**

Claim 13 depends from allowable claim 9 and is allowable for the reasons given above. Applicants submit that claim 13 is allowable because the combination of Lioy, Yun and Connolly does not teach or suggest the limitation "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station". Lioy and Yun have been discussed above. Connolly is directed toward a wireless personal communications system having voice/data image two-way calling and intercell handoff provided through distributed logic. The personal communication system facilitates direct interconnection and switching of PCS call traffic through the digital network interface and the public switched telephone network, or any switched network. (Abstract) The intercell protocol hand-off being provided through distributed logic which is implemented in software that is resident in the intelligent portable handset terminals, in the intelligent base stations, and in the public switched telephone network (or any switched network). (Abstract). Neither Lioy, Yun, nor Connolly teaches or suggests the limitation "determining, at the mobile station, whether changing from communicating over the first radio access network to communicating over the second radio access network will cause routing ambiguity for data sent to and from the mobile station" found in parent claim 9. Applicants therefore submit that claim 13 is allowable as depending from an allowable base claim.

## PATENT

## REQUEST FOR ALLOWANCE

In view of the foregoing, Applicant submits that all pending claims in the application are patentable. Accordingly, reconsideration and allowance of this application are earnestly solicited. Should any issues remain unresolved, the Examiner is encouraged to telephone the undersigned at the number provided below.

Respectfully submitted,

Dated: April 8, 2005

By: Roberta A. Young  
Roberta A. Young, Reg. No. 53,813  
(858) 658-5803

QUALCOMM Incorporated  
5775 Morehouse Drive  
San Diego, California 92121  
Telephone: (858) 658-5787  
Facsimile: (858) 658-2502

BEST AVAILABLE COPY

Attorney Docket No.: 010054  
Customer No.: 23696

**This Page is Inserted by IFW Indexing and Scanning  
Operations and is not part of the Official Record**

**BEST AVAILABLE IMAGES**

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images include but are not limited to the items checked:

- ☐ BLACK BORDERS
- ☐ IMAGE CUT OFF AT TOP, BOTTOM OR SIDES
- ☐ FADED TEXT OR DRAWING
- ☐ BLURRED OR ILLEGIBLE TEXT OR DRAWING
- ☐ SKEWED/SLANTED IMAGES
- ☐ COLOR OR BLACK AND WHITE PHOTOGRAPHS
- ☐ GRAY SCALE DOCUMENTS
- ☒ LINES OR MARKS ON ORIGINAL DOCUMENT
- ☐ REFERENCE(S) OR EXHIBIT(S) SUBMITTED ARE POOR QUALITY
- ☐ OTHER: \_\_\_\_\_

**IMAGES ARE BEST AVAILABLE COPY.**

**As rescanning these documents will not correct the image problems checked, please do not report these problems to the IFW Image Problem Mailbox.**